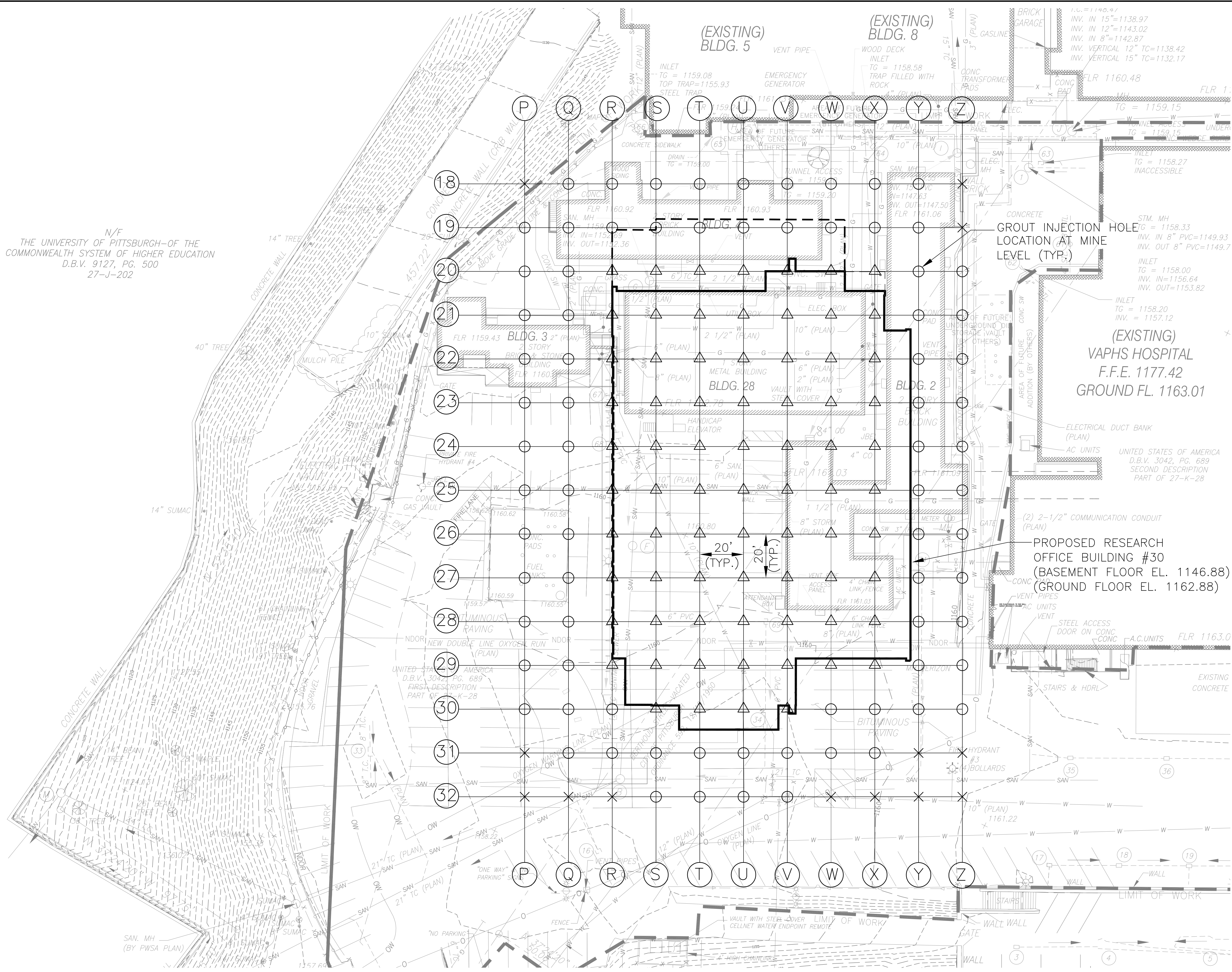
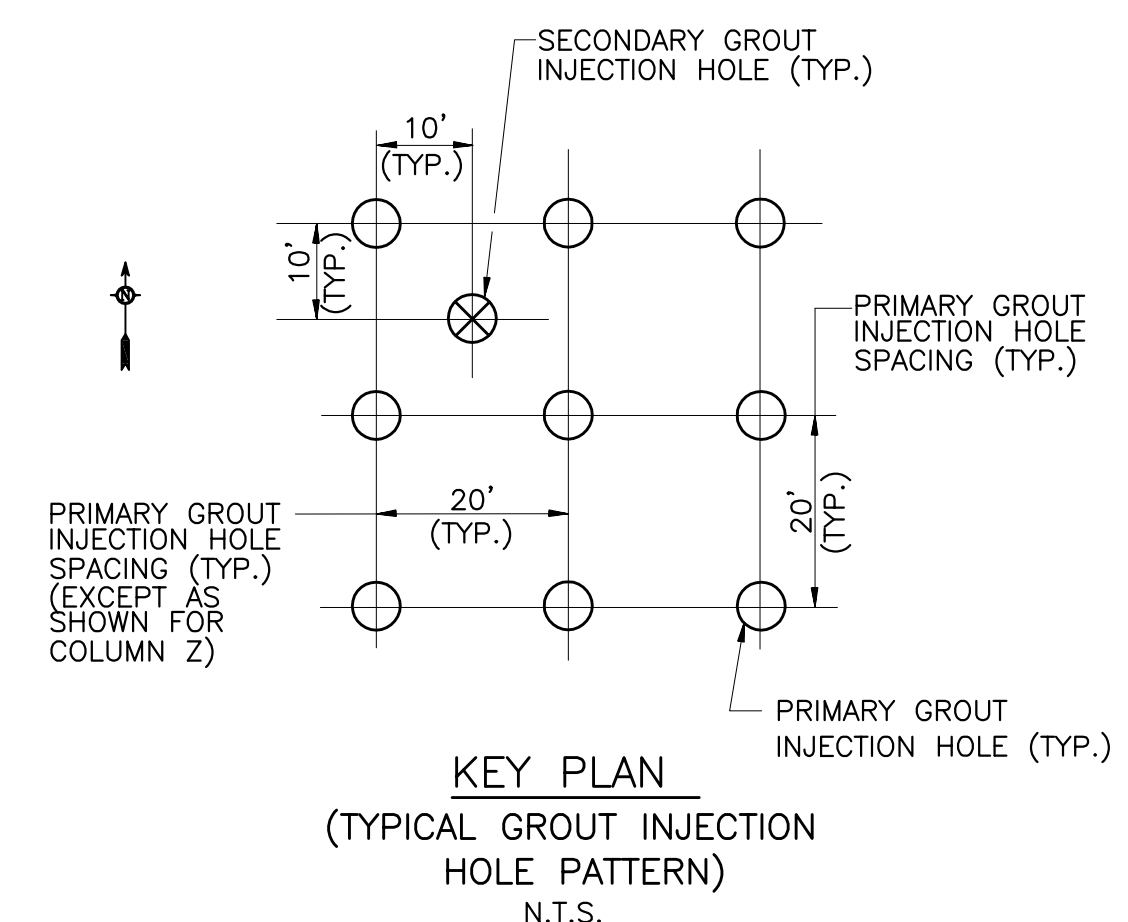


three inches = one foot
one and one half inches = one foot
one inch = one foot
three quarters inch = one foot
one half inch = one foot
three eighths inch = one foot
one quarter inch = one foot
one eighth inch = one foot
one sixteenth inch = one foot



THIS DRAWING WAS DEVELOPED BY GAI CONSULTANTS, INC.



- NOTES:
1. GROUT HOLE LOCATIONS ARE SHOWN WHERE THEY INTERCEPT THE BASE OF COAL AT APPROXIMATE ELEVATION 1060 FEET. THE GROUND SURFACE LOCATIONS OF GROUT HOLES MAY DIFFER FROM THE MINE LEVEL LOCATIONS WHERE INCLINED HOLES ARE REQUIRED TO AVOID OBSTRUCTIONS, FIRE LANES, OR SIMILAR. THE GROUND SURFACE LOCATIONS ARE TO BE FIELD DETERMINED.
 2. SEE PROJECT GROUTING SPECIFICATIONS AND LEGEND FOR SEQUENCE OF DRILLING AND GROUTING.
 3. USE THIS DRAWING ONLY FOR THE GROUTING PROGRAM. REFER TO OTHER DRAWINGS FOR OTHER DETAILS.
 4. THE LOCATIONS OF ALL UTILITIES ARE APPROXIMATE AND MUST BE VERIFIED BEFORE EXCAVATING OR DRILLING.

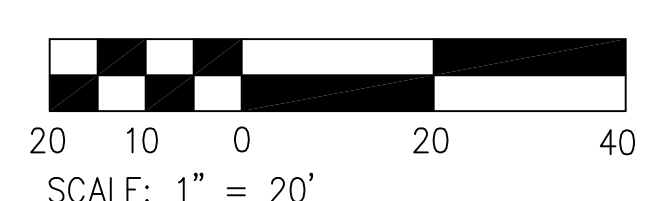
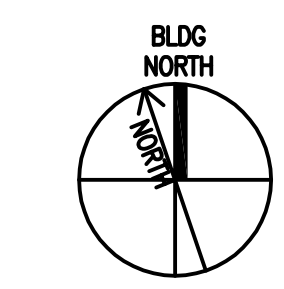
- LEGEND:
- PRIMARY GROUT INJECTION HOLES:
- — BARRIER HOLE
 - △ — INTERIOR HOLE
 - × — LOCATION NOT USED
- SECONDARY GROUT INJECTION HOLES:
- ⊗ — LOCATIONS TO BE DETERMINED DURING PRIMARY GROUT INJECTION PROGRAM




THIS DRAWING WAS DEVELOPED FROM DRAWING 6-CS1-000 RECEIVED FROM ASTORINO. INFORMATION PERTAINING TO MINE GROUTING WORK AT THE RESEARCH OFFICE BUILDING (ROB) WAS DEVELOPED BY GAI CONSULTANTS, INC.

NOTE: THE UTILITY LOCATIONS SHOWN ON THIS PLAN ARE APPROX. LOCATIONS ONLY AS PER UTILITY COMPANY INFORMATION AND INFORMATION SUPPLIED BY THE PA ONE CALL SYSTEM.



SERIAL #
Design:
*BEFORE YOU DIG ANYWHERE IN PENNSYLVANIA, STOP!
CALL PA ONE-CALL AT 1-800-242-1778 TOLL FREE FOR ACTUAL FIELD UTILITY LOCATIONS.
PENNSYLVANIA ACT 38 (1991) REQUIRES NO LESS THAN 3 WORKING DAYS NOTICE NOR MORE THAN 10 WORKING DAYS NOTICE FROM EXCAVATORS WHO ARE ABOUT TO DIG, DRILL, BLAST, AUGER, BORE, GRADE, TRENCH, OR DEMOLISH WHEN IN THE CONSTRUCTION PHASE. A DESIGNER IS REQUIRED TO GIVE NO LESS THAN 10 WORKING DAYS NOTICE NOR MORE THAN 90 WORKING DAYS NOTICE WHEN ENGAGED IN THE DESIGN PHASE. BOTH OF THESE CONDITIONS INVOLVE THE ENTIRE COMMONWEALTH.



		CONSULTANTS:				ARCHITECT/ENGINEERS:		Drawing Title MINE GROUTING RESEARCH OFFICE BUILDING		Project Title VA CARES CONSOLIDATION VAMC, PITTSBURGH, PA RESEARCH OFFICE BLDG.		Project Number 646CA2500R		Office of Facilities Management	
										Building Number 30		Drawing Number CM1-100			
		HDR Architecture, Inc.						Approved: Project Director		Location VAPHS UNIVERSITY DRIVE					
								Date 08-18-10		Checked RWB		Drawn BRB			
Revisions:		Date		1101 King Street Suite 400 Alexandria, Virginia 22314-2944 703.518.8500		gai consultants						Dwg. -- of --			
 Department of Veterans Affairs															